

REMARKS

Claims 1-20 are pending in this application. Claims 5, 7, 9 and 13-18 stand withdrawn. Claims 1, 2 and 16 are independent claims. By this Amendment, claim 1 is amended. No new matter is added.

Restriction

Upon allowance of either generic claim 1 or 2, rejoinder and allowance of the withdrawn claims is requested.

Claim Rejections under 35 U.S.C. §102

Claims 1-4, 10, 19 and 20 are rejected under 35 U.S.C. §102(b) as being anticipated by WO 95/21690 to Gardin et al. ("Gardin"). The rejection is respectfully traversed.

In the embodiment of the press described in Gardin at, for example, page 10, the safety liner 3 may be provided with a channel 14 and the safety liner 3 may be arranged in direct contact with the outermost cylinder element 1 and the final prestress element 7 (wound steel wire) is provided on an outer envelope of the outermost cylinder. Thus, according to Gardin, the final prestress element 7 is required since the outermost cylinder element is not fully prestressed when the safety liner 3 is inserted therein (see page 10, lines 31-35 of Gardin).

In contrast, the present claims recite a radially prestressed force-absorbing body having an inner surface being in direct contact with a pressure medium when the pressure chamber is filled with pressure medium. The force-absorbing body is provided with tunnel-like passages or grooves on an outer envelope surface. A prestressing device is provided around the outer envelope surface of the force

absorbing body for providing the radial prestress. The tunnel-like passages are defined by a groove in the outer envelope surface of the force-absorbing body and a portion of said prestressing device covering the force-absorbing body. Thus, the prestressing device provides the necessary assistance in taking up the radial loads on the force-absorbing body to thereby obtain the final prestress.

Thus, the contrary to the present claims, Gardin requires both the wound steel wire 7 and the outermost cylinder element 1 to obtain the final prestress. Therefore, Gardin fails to disclose a radially prestressed force-absorbing body having an inner surface being in direct contact with a pressure medium when the pressure chamber is filled with pressure medium. The force-absorbing body is provided with tunnel-like passages (grooves) on an outer envelope surface and a prestressing device is provided around the outer envelope surface of the force-absorbing body for providing the radial prestress. The tunnel-like passage being defined by a groove in said outer envelope surface of the force-absorbing body and a portion of said prestressing device covering the force-absorbing body. Because Gardin fails to disclose each of the claim elements, the rejection should be withdrawn.

Moreover, according to Gardin, "the high-pressure cylinder 1, 2, 3 is radially prestressed by means of a first wire winding 7 of steel wire." According to Gardin, the elements 1, 2, 3 comprise the high-pressure cylinder and the wire winding 7 is the prestressing device. Thus, contrary to the interpretation of Gardin in the Office Action, the outermost cylinder element 1 is not a prestressing device, but is rather merely a portion of the cylinder 1, 2, 3. According to Gardin, it is the steel wire winding 7 that is the prestressing device. Applicants again respectfully remind the Examiner that statements and disclosures in a reference cannot be given meanings they would not have had to one skilled in the art having no knowledge of Applicant's invention or to

anyone else who can read the specification with understanding.¹ Thus, interpreting the outer cylindrical element 1 as the prestressing device is inconsistent with the clear disclosure of Gardin and therefore is prohibited.

Moreover, as discussed above, page 10, lines 31-35, Gardin describe another embodiment of the cylinder 1, 2, 3 which recites that “the safety liner (3) may be arranged direct in the outermost cylinder element (1), without intermediate supporting liners or other cylinder elements (2). As discussed, in that case, the outer cylinder element (1) is not fully prestressed when the safety liner (3) is inserted thereinto. The final predetermined prestress of the cylinder element (1) and the safety liner (3) is obtained, for example, by winding steel wire (7) around the outer cylinder element (1) after the safety liner (3) has been inserted.”

Thus, Gardin merely discloses two embodiments, one of which includes elements 1, 2 and 3 being prestressed by the wire 7 and another embodiment where the liner 2 is removed and elements 1 and 3 are prestressed by the wire 7. Therefore, Gardin does not disclose or suggest that the outer cylindrical element 1 is a prestressing device.

Because Gardin outermost cylinder element 1 does not provide the radial prestress in the safety liner 3, the outermost cylinder element does not correspond to claim element. Because Gardin fails to disclose or suggest the features of the claims, withdrawal of the rejection is requested.

Claim Rejections under 35 U.S.C. §103

Claims 11 and 12 are rejected under 35 U.S.C. §102(b) as anticipated by or, in the alternative, under 35 U.S.C. §103(a) as being unpatentable over Gardin. The rejection is traversed.

¹ See *In re Wright*, 866 F.2d 422, 426, 9 USPQ2d 1649 (Fed. Cir. 1989).

Claims 11 and 12 are allowable for their dependency on independent claim 1 for the reasons discussed above, as well as for the additional features recited therein. As such, withdrawal of the rejection is requested.

Claims 1-4, 6, 8, 10-12, 19 and 20 are rejected under 35 U.S.C. §103(a) as being unpatentable over U.S. Patent Application Publication 2002/0076347 to Maerz ("Maerz") in view of U.S. Patent Publication 2004/0004314 to Yoneda ("Yoneda") and further in view of Gardin. The rejection is traversed.

In rejecting the claims, it is stated in the Office Action that it is "unclear if Maerz discloses an isostatic press comprising a prestressing device, provided around an outer envelope surface of the force-absorbing body, the force-absorbing body thereby being radially prestressed; and at least one tunnel-like passage running essentially over the length of said outer envelope surface of the force-absorbing body, the tunnel-like passage being defined by a groove in said outer envelope surface of the force-absorbing body and a portion of said prestressing device covering said groove, for conducting pressure medium to a point of detection if such medium has leaked out from the pressure chamber to the outer envelope surface of the force-absorbing body." Thus, Maerz is only relied upon as disclosing a pressure chamber for accommodating a pressure medium 6 (water). Applicants submit that, in fact, Maerz is silent regarding the structural features of press shown in Fig. 1. As such, it is clear that Maerz fails to disclose or suggest the claim features. Further, Maerz makes no mention whatsoever of a need for detecting leaks in the press, or for any modification to the press of Fig. 1 as there is no discussion of the press in Maerz.

In an effort to overcome the deficiencies of Maerz, it is alleged that it would have been obvious to one of skill in the art at the time of the present invention to modify the

press of Maerz according to the teachings of Yoneda “to achieve the benefits discussed above” (i.e., the missing elements of the claims not taught by Maerz).

Applicants firstly submit that such grounds for modifying Maerz (i.e., to include the features of the claims) does not comply with the requirements set forth in *KSR Int’l Co. v. Teleflex Inc.*² to establish obviousness, in as much as the stated grounds do not provide ‘articulated reasoning with some rational underpinning to support the legal conclusion’. In other words, by simply alleging that the motivation to combine is to achieve the claim features, the Examiner has neither identified any objective teaching in the prior art, nor referenced knowledge generally available to one of ordinary skill in the art that would have led that individual to combine the two cited references. Moreover, the Examiner has not provided any reasoning why not having grooves on a surface of a force-absorbing body or the lack of the remaining claim elements presented problems that needed to be solved. As such, the rejection should be withdrawn.

Further, the person skilled in the art would not look to Yoneda to solve the problem of detecting leaks of pressure medium, as Yoneda discusses a different problem for a different type of press, (i.e. detecting leaks of cooling water in a high temperature/high pressure vessel having a water cooling system for internal cooling the cylindrical body of the press). In Yoneda, leakage of cooling water can be detected by means of detecting grooves 2e and 2f. As such, there is no motivation to combine the references.

Further, Yoneda fails to disclose a pressure chamber being enclosed by a radially prestressed force-absorbing body having an inner surface being in direct contact with a pressure medium when the pressure chamber is filled with pressure

² 550 U.S. 398 (2007), quoting *In re Kahn*, 441 F.3d 977 (Fed. Cir. 2006)

medium. Rather, Yoneda discloses that at least an insulating layer 21 and a heater 22 are between the alleged force-absorbing body 2 and any pressure medium.

Yoneda also fails to disclose a prestressing device, provided around an outer envelope surface of the force-absorbing body for providing the radial prestress in the force-absorbing body; and at least one tunnel-like passage running essentially over the length of said outer envelope surface of the force-absorbing body, the tunnel-like passage being defined by a groove in said outer envelope surface of the force-absorbing body and a portion of said prestressing device covering the force-absorbing body, for conducting pressure medium to a point of detection if such medium has leaked out through said force-absorbing body to the outer envelope surface of the force-absorbing body, as recited by claim 1.

As discussed above, Yoneda discloses detecting leaks of cooling water from a cooling header 8 in a high temperature/high pressure vessel having a water cooling system for internal cooling the cylindrical body of the press. Thus, in Yoneda, leakage of pressure medium cannot be detected in such a press, only leakage of cooling water can be detected. Fractures to the inner cylinder (2a), i.e. leakage of pressure medium from the pressure chamber, may not be detected. This is because the leaking pressure medium would not enter into the detecting grooves. Only if both outer cylinder (2b) and inner cylinder (2a) crack will the pressure medium enter into the detecting grooves (2e and 2f). Also in such case, it cannot be determined whether it is cooling water or pressure medium that is actually detected. Hence, in the event of fractures to both the inner and the outer cylinder it is very difficult to isolate the case of fractures to both cylinders, i.e. actual leakage of pressure medium from the pressure chamber to the outer envelope surface of the outer cylinder, from the case of fractures to the outer cylinder only since the cooling water will mix with the pressure medium.

Moreover, even were one skilled in the art to combine Maerz with Yoneda, he would most likely add a prestressing device in the form of piano wire wound around the pressure cylinder 4 and also replace the pressure cylinder with a two-layer cylinder having cooling channels. Furthermore, he would possibly add the spacer pieces of Yoneda between the outer cylinder and the prestressing device such that channels are formed along the length of the outer cylinder. Still, leakage of pressure medium cannot be detected.

Also, even considering *arguendo* that one skilled in the art would or could combine Maerz and Yoneda with Gardin in order to solve the problem of detecting leakage of pressure medium, he would most likely add the thin safety liner of Gardin with grooves inside the inner cylinder or possibly add grooves on the outside of the inner cylinder. The person skilled in the art would also possibly modify the cooling water leakage channels to be formed by grooves in the outer cylinder instead of using spacer pieces. Either way, the invention according to the independent claims would not be achieved since the resulting press does not comprise a tunnel-like passage for conducting pressure medium to a point of detection being defined by a groove in the outer envelope surface of the force-absorbing body and a portion of the prestressing device covering the groove.

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CONCLUSION

Accordingly, in view of the above amendments and remarks, reconsideration of the objections and rejections and allowance of each of claims 1-20 in connection with the present application is earnestly solicited.

Should there be any outstanding matters that need to be resolved in the present application, the Examiner is respectfully requested to contact John A. Castellano at the telephone number of the undersigned below.

If necessary, the Commissioner is hereby authorized in this, concurrent, and future replies, to charge payment or credit any overpayment to Deposit Account No. 08-0750 for any additional fees required under 37 C.F.R. § 1.16 or under 37 C.F.R. §1.17; particularly, extension of time fees.

Respectfully submitted,

HARNESS, DICKY, & PIERCE, B.L.C.

By:  41,018

John A. Castellano, Reg. No. 35,094

P.O. Box 8910
Reston, Virginia 20195
(703) 668-8000

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